

(12) INTERNATIONAL APPLICATION PUBLISHED UNDER THE PATENT COOPERATION TREATY (PCT)

(19) World Intellectual Property Organization
International Bureau



(43) International Publication Date
30 October 2003 (30.10.2003)

PCT

(10) International Publication Number
WO 03/090450 A2

(51) International Patent Classification⁷: **H04N**
(21) International Application Number: PCT/US03/12178
(22) International Filing Date: 21 April 2003 (21.04.2003)
(25) Filing Language: English
(26) Publication Language: English
(30) Priority Data:
60/374,280 19 April 2002 (19.04.2002) US
(71) Applicant (for all designated States except US): **THOMSON LICENSING S.A.** [US/US]; 2 Independence Way - Suite 2, Princeton, NJ 08540 (US).

(81) Designated States (national): AE, AG, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, BZ, CA, CH, CN, CO, CR, CU, CZ, DE, DK, DM, DZ, EC, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, MZ, NI, NO, NZ, OM, PH, PL, PT, RO, RU, SC, SD, SE, SG, SK, SL, TJ, TM, TN, TR, TT, TZ, UA, UG, US, UZ, VC, VN, YU, ZA, ZM, ZW.

(84) Designated States (regional): ARIPO patent (GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW), Eurasian patent (AM, AZ, BY, KG, KZ, MD, RU, TJ, TM), European patent (AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, HU, IE, IT, LU, MC, NL, PT, RO, SE, SI, SK, TR), OAPI patent (BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG).

(72) Inventor; and

(75) Inventor/Applicant (for US only): **GEORGE, John, Barrett** [US/US]; 11408 Lakeshore Drive, Carmel, IN 46033 (US).

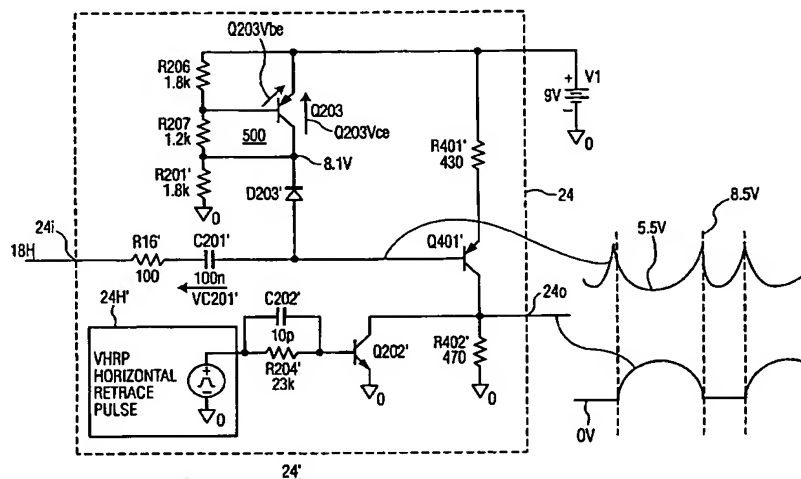
Published:

— without international search report and to be republished upon receipt of that report

(74) Agents: **TRIPOLI, Joseph, S. et al.**; c/o Thomson Licensing Inc., 2 Independence Way - Suite 2, Princeton, NJ 08540 (US).

For two-letter codes and other abbreviations, refer to the "Guidance Notes on Codes and Abbreviations" appearing at the beginning of each regular issue of the PCT Gazette.

(54) Title: **WAVEFORM GENERATOR FOR CONTROLLING AN ELECTRON BEAM IN A CATHODE RAY TUBE**



(57) Abstract: A parabola generator for providing dynamic correction includes a capacitor a source of a parabolic input signal at a frequency related to a horizontal deflection frequency coupled to a first terminal of the capacitor. A diode switch is coupled to a voltage at a reference level and to a second terminal of the capacitor for periodically clamping a peak level of a signal developed at the second terminal. A transistor switch is responsive to a periodic switch control signal and coupled to the second terminal of said capacitor for periodically clamping a signal applied from the second terminal, during retrace, for removing a parasitic parabolic voltage portion to generate a dynamic correction signal. The dynamic correction signal is coupled to a cathode ray tube to vary a field in a beam path of an electron beam of the cathode ray tube for providing dynamic correction.

BEST AVAILABLE COPY

WO 03/090450 A2